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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/529,588	04/17/2000	LARRY S. MILLSTEIN	LAMILL2	2048

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EXAMINER	
TRAN, MY CHAU T	
ART UNIT	**PAPER NUMBER**
1639	

DATE MAILED: 07/29/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/529,588	MILLSTEIN, LARRY S.	
	Examiner	Art Unit	
	MY-CHAU T. TRAN	1639	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *07 July 2005*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *48-55,57-67,69,71,73,74,76-78,94-97,100-105,107-131,133-135,137 and 138* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *48-55,57-67,69,71,73,74,76-78,94-97,100-105,107-131,133-135,137 and 138* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *17 April 2000* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date *7/7/05*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

1. Applicant is advised that the Notice of Allowance mailed 02/17/2005 is vacated. If the issue fee has already been paid, applicant may request a refund or request that the fee be credited to a deposit account. However, applicant may wait until the application is either found allowable or held abandoned. If allowed, upon receipt of a new Notice of Allowance, applicant may request that the previously submitted issue fee be applied. If abandoned, applicant may request refund or credit to a specified Deposit Account.

Application and Claims Status

2. Applicant's amendment and response filed 01/31/2005 is acknowledged and entered. Claims 48, 94-97, 135, 137, and 138 have been amended.

3. Claims 106, 132, and 136 were canceled and Claims 48, 57, 111, 121, and 129 were amended by the examiner amendment filed on 3/25/2003.

4. Claims 56, 68, 70, 72, 75, 79-93, 98-99 were canceled; Claims 48-55, 57-58, 63-67, 69, 71, 73, 76, 78, and 95-97 were amended; and Claims 100-138 were added by the amendment filed on 1/2/2003.

5. Claims 48, 50, 52, 64, 66, 71, 76, 77, and 79 were amended and Claims 94-99 were added by the amendment filed on 7/10/2002.

6. Claims 1-47 were canceled and Claims 48-93 were added by the preliminary amendment filed on 3/8/2001.

7. Claims 48-55, 57-67, 69, 71, 73-74, 76-78, 94-97, 100-105, 107-131, 133-135, 137, and 138 are pending.

8. Claims 48-55, 57-67, 69, 71, 73-74, 76-78, 94-97, 100-105, 107-131, 133-135, 137, and 138 are treated on the merit in this Office Action.

9. Prosecution on the merits of this application is reopened on claims 48-55, 57-67, 69, 71, 73-74, 76-78, 94-97, 100-105, 107-131, 133-135, 137, and 138 considered unpatentable for the reasons indicated below:

10. *The instant invention recites a method of making replicate arrays. The method comprises the step of repeatedly sectioning a bundle of aligned array members disposed in structural members to make wafers.*

The wafers comprise replicate arrays and in each wafer formed by the sectioning the bundle of each structural member and each array member disposed therein occupies a defined position in the two dimensions orthogonal to the alignment axis and extends from a first to a second surface formed by the sectioning.

The replicate arrays comprise 1) each of the structural members is aligned in the bundle parallel to an alignment axis and continuously encloses a lumen through its length parallel to the axis; 2) each of the array members in the bundle is a homogeneous composition disposed within a lumen of a structural member and is continuously encloses therein through the length of the structural member parallel to the axis; and 3) in forming the bundle the array members are disposed in the lumen such that upon and by the disposition therein the array members are therein continuously encloses by the structural members through their length parallel to the axis.

Claim Rejections - 35 USC § 102

11. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
>
> (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

12. Claims 48, 51, 55, 58-60, 71, 73, 74, 76-78, 94, 96, 97, 100-102, 105, 117-119, 121, 124-127, 129-131, 133-135, 137, and 138 are rejected under 35 U.S.C. 102(b) as being anticipated by Pharmacia Biotech AB (WO 96/17,246) (refers to as Pharmacia). *Note: This prior art was provided by applicant* (See *PTO-1449 filed 07/07/2005).*

Pharmacia discloses an array of selected immobilized molecules and the methods of making the array (see e.g. Abstract; pg. 1, lines 2-10; pg. 2, line 21 thru pg. 3, line 23). The method comprises the steps of a) bundling and fixing together carrier elements wherein each element having immobilized thereto a selected molecule and having an identifiable position in the array; b) sectioning the bundles (refers to the instant claimed sectioning step); and c) depositing the sections on a support (see e.g. pg. 2, line 21 thru pg. 3, line 11; pg. 4, lines 4-19; pg. 4, line 36 thru pg. 5, line 5; fig. 1; claims 1, 2, 8-10, 11, 14, and 20). The carrier elements (refers to the instant claimed structural members) include capillaries that comprise material such as glass or plastic, and inside each capillary are affixed with a selected molecule (see e.g. pg. 3, lines 33-35; pg. 4, lines 4-19; pg. 4, line 36 thru pg. 5, line 5; fig. 1). The selected molecules

(refers to the instant claimed array members) include molecules such as oligonucleotides, DNA and proteins (see e.g. pg. 3, lines 33-35; pg. 6, lines 27-31; claims 9 and 20). The sectioning is performed by a microtome or a laser (see e.g. pg. 5, lines 25-28). The array can be used in many different applications such as immunoassay (refers to the instant claimed step of using the array in an assay)(see e.g. pg. 6, line 36 thru pg. 7, line 13). Therefore, the method of Pharmacia anticipates the presently claimed invention.

13. Claims 48, 51, 55, 58-60, 71, 73, 74, 76-78, 94, 96, 97, 100-102, 105, 117-119, 121, 124-127, 129-131, 133-135, 137, and 138 are rejected under 35 U.S.C. 102(e) as being anticipated by Landegren et al. (US Patent 6,140,135).

Landegren et al. discloses an array of selected immobilized molecules and the methods of making the array (see e.g. Abstract; col. 1, lines 6-13; col. 1, line 66 thru col. 2, line 21). The method comprises the steps of a) bundling and fixing together carrier elements wherein each element having immobilized thereto a selected molecule and having an identifiable position in the array; b) sectioning the bundles (refers to the instant claimed sectioning step); and c) depositing the sections on a support (see e.g. col. 1, line 66 thru col. 2, line 21; col. 2, lines 51-65; col. 3, lines 21-28; fig. 1; claims 1, 2, and 8). The carrier elements (refers to the instant claimed structural members) include capillaries that comprise material such as glass or plastic, and inside each capillary are affixed with a selected molecule (see e.g. col. 2, lines 43-45; col. 2, lines 51-65; col. 3, lines 21-28; fig. 1). The selected molecules (refers to the instant claimed array members) include molecules such as oligonucleotides, DNA and proteins (see e.g. col. 2, lines 43-45; col. 4, lines 17-24; claim 8). The sectioning is performed by a microtome or a laser

(see e.g. pg. 5, lines 25-28). The array can be used in many different applications such as immunoassay (refers to the instant claimed step of using the array in an assay)(see e.g. col. 4, lines 25-42). Therefore, the method of Landegren et al. anticipates the presently claimed invention.

14. Claims 48-53, 55, 57-62, 71, 73-74, 76-78, 94, 96-97, 100-103, 105, 108, 117-121, 124-131, 133-135, 137, and 138 are rejected under 35 U.S.C. 102(e) as being anticipated by Stimpson (US Patent 6,037,186; *filed* 7/16/1997).

Stimpson teaches a method to produce arrays of compounds (see e.g. Abstract; col. 1, 6-14; col. 3, lines 30-54; col. 4, lines 22-34). Two formats of producing the arrays of compounds are described. In one format the compounds (refers to the instant claimed array members) of the array are immobilized to porous rod elements (refers to the instant claimed structural members) and a bundle is formed by radial compression of the rods (see e.g. col. 3, lines 47-51; col. 4, lines 7-11; fig. 1A). The rods comprise materials such as glass, polystyrene, or polypropylene (col. 10, lines 16-49) (refers to claims 58-62 and 130-131). The second format thin lines of the compounds are applied on a single sheet of material and roll to form a spiral bundle (refers to instant claimed structural members)(see e.g. col. 5, lines 9-47; col. 7, lines 49-60; col. 7, line 66 thru col. 8, line 13; figs. 2A, and 2C). The compounds include biological compounds such as nucleic acid and proteins (refers to the instant claimed array members)(see e.g. col. 3, lines 47-51; col. 7, lines 19-26). The method disclosed a random synthesis of a number of compounds resulting in different array elements for each rod within a bundle of rods (col. 10, line 60 to col. 11, line 12) (refers to the instant claimed '*at least two array members are different from one*

another'). In both format, the bundle and the arrays are cut (refers to the instant claimed sectioning step) as slabs resulting in a high density array (refers to the instant claimed wafers)(see e.g. col. 8, lines 7-13; col. 9, lines 13-17; col. 12, lines 11-41). The rods or spiral bundles are secure with a sheath material, i.e. embedding the rod in a plastic embedding media (see e.g. col. 12, lines 11-41; col. 12, line 57 thru col. 13, line 14). The location of the rods and array elements are noted by "marking" the rods (refers to instant claims 50, 101, 108, 118, and 126) (see e.g. col. 10, lines 58-60; col. 11, lines 18-31). The bundle arrays are section by either a microtome or laser device (refers to the instant claimed '*smooth planar cut*')(see e.g. col. 12, lines 12-17 and lines 42-54). The thickness of the cut slabs is in the range of 0.2-1 mm thick (refers to instant claim 69)(see e.g. col. 9, lines 13-17; col. 12, lines 11-14). The array is use to carry out assay such as binding assay (refers to the instant claimed step of using the array in an assay)(col. 6, lines 8-36; col. 12, line 57 to col. 14, line 5). The array elements can be labels with either direct or direct labeling with enzymes (see e.g. col. 11, lines 46-59). Therefore, the method of Stimpson anticipates the presently claimed invention.

Claim Rejections - 35 USC § 103

15. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

16. Claims 48-55, 57-67, 69, 71, 73-74, 76-78, 94-97, 100-105, 107-131, 133-135, and 137-138 are rejected under 35 U.S.C. 103(a) as being unpatentable over Pharmacia Biotech AB (WO 96/17,246) (refers to as Pharmacia) and Stimpson (US Patent 6,037,186; *filed* 7/16/1997).

Pharmacia discloses an array of selected immobilized molecules and the methods of making the array (see e.g. Abstract; pg. 1, lines 2-10; pg. 2, line 21 thru pg. 3, line 23). The method comprises the steps of a) bundling and fixing together carrier elements wherein each element having immobilized thereto a selected molecule and having an identifiable position in the array; b) sectioning the bundles (refers to the instant claimed sectioning step); and c) depositing the sections on a support (see e.g. pg. 2, line 21 thru pg. 3, line 11; pg. 4, lines 4-19; pg. 4, line 36 thru pg. 5, line 5; fig. 1; claims 1, 2, 8-10, 11, 14, and 20). The carrier elements (refers to the instant claimed structural members) include capillaries that comprise material such as glass or plastic, and inside each capillary are affixed with a selected molecule (see e.g. pg. 3, lines 33-35; pg. 4, lines 4-19; pg. 4, line 36 thru pg. 5, line 5; fig. 1). The selected molecules (refers to the instant claimed array members) include molecules such as oligonucleotides, DNA and proteins (see e.g. pg. 3, lines 33-35; pg. 6, lines 27-31; claims 9 and 20). The sectioning is performed by a microtome or a laser (see e.g. pg. 5, lines 25-28). The array can be used in many different applications such as immunoassay (refers to the instant claimed step of using the array in an assay)(see e.g. pg. 6, line 36 thru pg. 7, line 13).

The method of Pharmacia differs from the presently claimed invention by failing to teach that the 'array members' form part of the first and second wafer surfaces.

Stimpson teaches a method to produce arrays of compounds (see e.g. Abstract; col. 1, 6-14; col. 3, lines 30-54; col. 4, lines 22-34). Two formats of producing the arrays of compounds

are described. In one format the compounds (refers to the instant claimed array members) of the array are immobilized to porous rod elements (refers to the instant claimed structural members) and a bundle is formed by radial compression of the rods (see e.g. col. 3, lines 47-51; col. 4, lines 7-11; fig. 1A). The rods comprise materials such as glass, polystyrene, or polypropylene (col. 10, lines 16-49) (refers to claims 58-62 and 130-131). The second format thin lines of the compounds are applied on a single sheet of material and roll to form a spiral bundle (refers to instant claimed structural members)(see e.g. col. 5, lines 9-47; col. 7, lines 49-60; col. 7, line 66 thru col. 8, line 13; figs. 2A, and 2C). The compounds include biological compounds such as nucleic acid and proteins (refers to the instant claimed array members)(see e.g. col. 3, lines 47-51; col. 7, lines 19-26). The method disclosed a random synthesis of a number of compounds resulting in different array elements for each rod within a bundle of rods (col. 10, line 60 to col. 11, line 12) (refers to the instant claimed '*at least two array members are different from one another*'). In both format, the bundle and the arrays are cut (refers to the instant claimed sectioning step) as slabs resulting in a high density array (refers to the instant claimed wafers)(see e.g. col. 8, lines 7-13; col. 9, lines 13-17; col. 12, lines 11-41). The rods or spiral bundles are secure with a sheath material, i.e. embedding the rod in a plastic embedding media (see e.g. col. 12, lines 11-41; col. 12, line 57 thru col. 13, line 14). The location of the rods and array elements are noted by "marking" the rods (refers to instant claims 50, 101, 108, 118, and 126) (see e.g. col. 10, lines 58-60; col. 11, lines 18-31). The bundle arrays are section by either a microtome or laser device (refers to the instant claimed '*smooth planar cut*')(see e.g. col. 12, lines 12-17 and lines 42-54). The thickness of the cut slabs is in the range of 0.2-1 mm thick (refers to instant claim 69)(see e.g. col. 9, lines 13-17; col. 12, lines 11-14). The array is use to

carry out assay such as binding assay (refers to the instant claimed step of using the array in an assay)(col. 6, lines 8-36; col. 12, line 57 to col. 14, line 5). The array elements can be labels with either direct or direct labeling with enzymes (see e.g. col. 11, lines 46-59).

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to teach that the 'array members' form part of the first and second wafer surfaces as taught by Stimpson in the method of Pharmacia. One of ordinary skill in the art would have been motivated to teach that the 'array members' form part of the first and second wafer surfaces in the method of Pharmacia for the advantage of providing a three-dimensional array that behave like membrane composed of porous materials and conduct flow through (Stimpson: col. 3, lines 36-46) since both Pharmacia and Stimpson disclose a method of making an array by bundling and sectioning the bundle (Stimpson: col. 8, lines 7-13; Pharmacia: pg. 2, line 21 thru pg. 3, line 11). Furthermore, one of ordinary skill in the art would have reasonably expectation of success in the combination of Stimpson and Pharmacia because Stimpson disclose by example 1 the success of making array by bundling and sectioning (Stimpson: col. 14, lines 7-26).

17. Claims 48-55, 57-67, 69, 71, 73-74, 76-78, 94-97, 100-105, 107-131, 133-135, and 137-138 are rejected under 35 U.S.C. 103(a) as being unpatentable over Pinkel et al. (US Patent 5,690,894) and Stimpson (US Patent 6,037,186).

Pinkel et al. disclose a method for fabricating biosensors comprising a plurality of biological binding partners, that is molecules that specifically bind other molecules to form a binding complex such as antibody-antigen, lectin-carbohydrate, nucleic acid-nucleic acid, biotin-

avidin, etc., linked to optical fibers (col. 3, lines 2-7). The multiplicity of optical fibers is bundled together to form an optical fiber array (col. 3, lines 18-20). Further, a multiplicity of species of biological binding partner may be attached to each group as long as the multiplicity of species of biological binding partners attached to one fiber group is different than the multiplicity of species attached to the other fiber groups (col. 3, lines 37-43). The binding partner includes nucleic acids, antibodies, proteins, and lectins (col. 3, lines 13-17).

The method of Pinkel et al. does not expressly disclose that sectioning the bundle of target-strands.

Stimpson teaches a method to produce arrays of compounds (see e.g. Abstract; col. 1, 6-14; col. 3, lines 30-54; col. 4, lines 22-34). Two formats of producing the arrays of compounds are described. In one format the compounds (refers to the instant claimed array members) of the array are immobilized to porous rod elements (refers to the instant claimed structural members) and a bundle is formed by radial compression of the rods (see e.g. col. 3, lines 47-51; col. 4, lines 7-11; fig. 1A). The rods comprise materials such as glass, polystyrene, or polypropylene (col. 10, lines 16-49) (refers to claims 58-62 and 130-131). The second format thin lines of the compounds are applied on a single sheet of material and roll to form a spiral bundle (refers to instant claimed structural members)(see e.g. col. 5, lines 9-47; col. 7, lines 49-60; col. 7, line 66 thru col. 8, line 13; figs. 2A, and 2C). The compounds include biological compounds such as nucleic acid and proteins (refers to the instant claimed array members)(see e.g. col. 3, lines 47-51; col. 7, lines 19-26). The method disclosed a random synthesis of a number of compounds resulting in different array elements for each rod within a bundle of rods (col. 10, line 60 to col. 11, line 12) (refers to the instant claimed '*at least two array members are different from one*

another'). In both format, the bundle and the arrays are cut (refers to the instant claimed sectioning step) as slabs resulting in a high density array (refers to the instant claimed wafers)(see e.g. col. 8, lines 7-13; col. 9, lines 13-17; col. 12, lines 11-41). The rods or spiral bundles are secure with a sheath material, i.e. embedding the rod in a plastic embedding media (see e.g. col. 12, lines 11-41; col. 12, line 57 thru col. 13, line 14). The location of the rods and array elements are noted by "marking" the rods (refers to instant claims 50, 101, 108, 118, and 126) (see e.g. col. 10, lines 58-60; col. 11, lines 18-31). The bundle arrays are section by either a microtome or laser device (refers to the instant claimed '*smooth planar cut*')(see e.g. col. 12, lines 12-17 and lines 42-54). The thickness of the cut slabs is in the range of 0.2-1 mm thick (refers to instant claim 69)(see e.g. col. 9, lines 13-17; col. 12, lines 11-14). The array is use to carry out assay such as binding assay (refers to the instant claimed step of using the array in an assay)(col. 6, lines 8-36; col. 12, line 57 to col. 14, line 5). The array elements can be labels with either direct or direct labeling with enzymes (see e.g. col. 11, lines 46-59).

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to include sectioning the bundle of target-strands as taught by Stimpson in the method of Pinkel et al. One of ordinary skill in the art would have been motivated to include sectioning the bundle of target-strands in the method of Pinkel et al. for the advantage of providing a three-dimensional array that behave like membrane composed of porous materials and conduct flow through (Stimpson: col. 3, lines 36-46). One of ordinary skill in the art would have reasonably expectation of success in the combination of Pinkel et al. and Stimpson because Stimpson disclose by example 1 the success of making array by bundling and sectioning (Stimpson: col. 14, lines 7-26).

Response to Arguments

18. Applicant's argument directed to the rejection under 35 USC 102(e) as being anticipated by Stimpson (US Patent 6,037,186; *filed* 7/16/1997) for claims 48-53, 55, 57-62, 71, 73-74, 76-78, 94, 96-97, 100-103, 105, 108, 117-121, 124-131, 133-135, 137, and 138 was considered but they are not persuasive for the following reasons.

Applicant contends that the method of Stimpson does not anticipate the presently claimed method because Stimpson does not teach or suggest that the array members are continuously encloses therein through the length of the structural member parallel to the axis. Therefore, the method of Stimpson does not anticipate the presently claimed method.

Applicant's arguments are not convincing since the method of Stimpson does anticipate the presently claimed method because Stimpson does not teach or suggest that the array members are continuously encloses therein through the length of the structural member parallel to the axis (Stimpson: col. 14, lines 7-26; fig. 2). Fig. 2 of Stimpson shows that thin lines of the compounds are applied on a single sheet of material and roll to form a spiral bundle, which would read on the limitation of "the array members are continuously encloses therein through the length of the structural member parallel to the axis". Thus, the method of Stimpson does anticipate the presently claimed method, and the rejection is maintained.

19. Applicant's argument directed to the rejection under 35 USC 103(a) as being unpatentable over Pinkel et al. (US Patent 5,690,894) and Stimpson (US Patent 6,037,186) for claims 48-55, 57-67, 69, 71, 73-74, 76-78, 94-97, 100-105, 107-131, 133-135, and 137-138 was considered but they are not persuasive for the following reasons.

Applicant alleges that the method combination of Pinkel et al. and Stimpson is not obvious over the presently claimed method because neither Pinkel et al. nor Stimpson teach or suggest that the array members are continuously encloses therein through the length of the structural member parallel to the axis. Therefore, the method combination of Pinkel et al. and Stimpson is not obvious over the presently claimed method.

Applicant's arguments are not convincing since the method combination of Pinkel et al. and Stimpson is obvious over the presently claimed method because Stimpson does not teach or suggest that the array members are continuously encloses therein through the length of the structural member parallel to the axis (Stimpson: col. 14, lines 7-26; figs 2). Fig. 2 of Stimpson shows that thin lines of the compounds are applied on a single sheet of material and roll to form a spiral bundle, which would read on the limitation of "the array members are continuously encloses therein through the length of the structural member parallel to the axis". Thus, the method combination of Pinkel et al. and Stimpson is obvious over the presently claimed method.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to My-Chau T. Tran whose telephone number is 571-272-0810. The examiner can normally be reached on Monday: 8:00-2:30; Tuesday-Thursday: 7:30-5:00; Friday: 8:00-3:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Andrew J. Wang can be reached on 571-272-0811. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

mct
July 14, 2005

ANDREW WANG
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 1600